The PRESIDING OFFICER. Without objection, it is so ordered.

EXPLORATION FOR OIL AND GAS IN THE ARCTIC NATIONAL WILD-LIFE REFUGE

Mr. DAYTON. Mr. President, I rise today to express my strong opposition to exploration and drilling for oil and gas in the Arctic National Wildlife Refuge, or ANWR, region of Alaska. On two occasions, I have visited this remote and rugged wilderness region. In the summer of 1996, my then-16-year-old son Eric and I joined my good friend, Will Steger, an internationally renowned Arctic explorer, and two other men, on a two-week expedition in the Brooks Mountain Range of ANWR.

On the evening of June 30, we pitched our tents on the icy tongue of an enormous glacier. The next morning, we awoke to find ourselves in a snowstorm. We trekked through fresh snow above our knees through near-white out conditions to the top of the Continental Divide. Then we slid down the other side, frequently using our backpacks as toboggans and our boot heels as runners. It was an adventure I will always remember.

The northern slope of this mountain range initially resembled a lunar land-scape. Giant boulders and other, smaller rocks covered the surface, which was otherwise devoid of plants and wildlife. As we continued, however, we reached the beginning of the grassy plains, which are the homes of millions of wildlife

What impressed me most is how vast and untouched the ANWR region is. From the time we were dropped off by one bush pilot until the time we were picked up 2 weeks later by another, we encountered only one other group of human beings. For the rest of our time, our companions were one bear, a few caribou, who had not moved on to the coastal plains, and several quadrillion mosquitoes. This region is totally untouched by human beings and by their industrial and technological intrusions. It is there for anyone and everyone who wish to encounter it on its terms, rather than on their own.

My second visit to the ANWR region occurred last March, at the invitation of my distinguished colleague, Senator Frank Murkowski of Alaska, who was then the chairman of the Energy and Natural Resources Committee. Senator Jeff Bingaman, then the ranking member and now the chairman of the same committee, and I joined Senator Murkowski, along with Secretary of the Interior Gale Norton; Ms. Mary Matalin, special assistant to the Vice President; and several committee staff.

We flew first to Anchorage, where we were greeted by Alaska's Governor, Tony Knowles, a college classmate of mine, and other Alaskan government and business leaders who outlined to us the enormous economic importance of oil production to Alaska. We then flew to Valdez, the southern end of the

trans-Alaskan oil pipeline, where I gazed in awe at magnificent snow-covered mountains, which arose from sea level to encircle us, and viewed enormous oil tankers being carefully escorted into and out of their ports.

From there, we flew up to the Prudhoe Bay region on Alaska's northern coast, where about one and onehalf million barrels of oil a day flow into the trans-Alaskan pipeline. After viewing some of the first drilling sites. we traveled to the nearby Alpine field, which is the newest and most technologically advanced of the Alaskan drilling operations. The Alpine field, which was only discovered in 1996, is located to the west of Prudhoe Bay, right on the coast of the Beaufort Sea. At 365 million barrels of recoverable reserves. it is one of the largest discoveries in the United States in recent years. We toured this very modern and technologically advanced facility, and I could not help but be impressed by the extensive efforts made to assure its safety of operation and its ecological compatibility. It was obviously built to be much more compact than the earlier operations, so as to leave a smaller "footprint" on the terrain. In fact, one of the Alaskan government officials, knowing that I come from Minnesota, had thoughtfully taken the time to investigate and discovered that the size of the Alpine complex was almost exactly the same as our famous shopping mall, the Mall of America. Alpine encompassed 97 acres, 1 acre smaller than Minnesota's mega-mall.

Our trip concluded with our final night in Barrow, AK, which is the northernmost town in our United States of America. We awoke Sunday morning, April 1, to an outdoor temperature of -35 degrees, which dropped to a -65 degrees, with the wind chill. I felt like an April Fool, as I walked the outdoor airport tarmac to our plane for our return flight.

This trip gave me an invaluable opportunity to see firsthand the region about which there has been so much debate in this Senate in recent months. I thank Senator Murkowski for inviting me, while knowing that I was an announced opponent of oil exploration and drilling in ANWR. Yet he and our other Alaskan hosts were most respectful, as well as most persuasive, as they presented their case.

The debate over whether to open ANWR to oil and gas exploration and drilling pits two enormously important national interests against each other. One is our need to find and develop domestic energy resources. Much more is unknown than is known about the full extent of ANWR's oil reserves. The U.S. Geological Survey has produced a range of estimates of the amount of oil which is technically recoverable. Their mean estimate is 7.7 billion barrels.

As we were informed on our trip last March, the oil industry's proposal to drill for and extract these reserves involves the construction of up to 20 drilling complexes, each one approxi-

mately the size of Alpine, along the coastal plain of ANWR. Thus, the legislation which passed the House last summer permits 2,000 acres of ANWR's coastal plain to be open for oil drilling. However, as I understand the House version, these 2,000 acres are not limited to one area. Rather, the legislation permits what the oil industry described to us last March: a chain of up to 20 Alpine complexes connected by oil pipelines extending along the coastal plain for as far as discovered and recoverable oil reserves are found.

In my visualization, this enormous and vast industrial project would resemble 20 Mall of America-sized structures being built at various junctures along the coastline of this wilderness area. That, remember, is the size of one of these drilling facilities.

Now, for those who have not yet visited our Mall of America—and I certainly encourage you to do so—it is the largest shopping mall in North America and, perhaps, the world. Tourists fly into Minnesota from all over our country and from cities throughout the world to shop there. Each of its four quadrangular concourses extends for slightly more than a mile, and its four shopping levels rise to the height of a typical seven-to-eight-story building. Like Alpine, it is a relatively compact structure; however, it is by no means a small "footprint" on the landscape.

So, I ask myself, how would the construction of up to 20 of these Mall of America-sized drilling complexes, each one encompassing almost 100 acres, connected to one another by a large oil pipeline, which also must be built and maintained along this corridor—how would this affect a wildlife refuge, with its hundreds of thousands of migrating caribou, and all the other wildlife that has existed here in ecological balance for thousands of years without the intrusion and interference of all the rest of us?

I must conclude that, however welldesigned and constructed, however carefully and safely operated, and however environmentally well-intended, this project could be, it will have an enormous and irrevocable impact upon the essential purpose for which ANWR was designated and for which it must be protected: as a National Wildlife Refuge. In fact, by its very definition, a national wildlife refuge area is antithetical to the 20 large and interconnected industrial complexes, which this oil drilling would entail. As such, a vote to permit oil drilling in ANWR is a vote for the destruction of ANWR.

I returned from my trip last March wondering if there was any way to reconcile these two choices: To develop domestic oil reserves and to protect this valuable national preserve. Upon reviewing the maps provided on our trip, I was surprised to notice for the first time a large region located to the west of Prudhoe Bay and Alpine, called the National Petroleum Reserve-Alaska. This area was scarcely mentioned during our visit to ANWR, and we visited none of it. Upon further research,

however, I discovered that this National Petroleum Reserve, encompassing 23 million acres, was established by Congress for oil and gas development. Why, I wondered, given all the controversy over oil drilling in ANWR, haven't the oil reserves in the National Petroleum Reserve been first explored and extracted? Wouldn't it be a far better energy policy to first extract the oil from a 23-million-acre area which has been established for that purpose?

Furthermore, oil production from the National Petroleum Reserve could begin several years before anything from ANWR. Under President Clinton's direction, in 1997, the Bureau of Land Management within the Department of the Interior conducted a study of a 4.6million-acre section in the northeast portion of the National Petroleum Reserve, which is the area immediately to the west of Alpine and Prudhoe Bay. The Bureau prepared an environmental impact statement leading up to lease sales in May 1999, which drew 174 bids from six different companies on 3.9 million acres. More than 130 bids were accepted, at a total revenue to the Government of \$104.6 million. This spring, Phillips Alaska, Inc., and Anadarko Petroleum Corporation reported discoveries of oil or gas, and Phillips indicated that these discoveries might be commercial. By early October of this year, Anadarko was in the process of securing permits to drill two additional prospect sites. The Interior and Related Appropriations Act for fiscal year 2002 provides \$2 million in funding for planning and preparation of another EIS, in anticipation of holding a lease sale in 2004 for tracts in the northwestern area of the National Petroleum Reserve.

The U.S. Geological Survey has estimated that the National Petroleum Reserve could hold technically recoverable resources of 820 million to 5.4 billion barrels of oil. However, these are only rough estimates. While these estimates are not as large as the current estimates of ANWR's potential, they are the equivalent of between 2 and 12 of the Alpine field. Thus, the choice which some would force upon us, whether to protect the Arctic National Wildlife Refuge or to continue the act of exploration for and development of our Nation's oil reserve is a false one. We can do both. We can, and we should, continue the environmental assessments and appropriate leasing of those sections of the 23-million-acre National Petroleum Reserve until those discovered and recoverable oil supplies have been mostly extracted. Then, and only then, would we possibly have either the need or the possible justification to turn our attention to possible sites in ANWR. However, it will take many years, probably a couple of decades, before we have completed the oil production out of the National Petroleum Reserve. Until then, we have no reason to permit oil drilling in ANWR.

The PRESIDING OFFICER. The Senator from Connecticut.

## SENATE VOTES

Mr. LIEBERMAN. Mr. President, I come to the floor to speak about two important votes we will have in a few hours, one on the Railroad Retirement Act and the other on the amendment introduced by the Senate Republican leader, which is an energy plan that includes authorization to drill in the Arctic National Wildlife Refuge.

I thank and congratulate my friend and colleague from Minnesota for the outstanding statement he made on this issue. I believe the debate thus far on the question of drilling in the Arctic Refuge has revealed a record that is not quite what the proponents of drilling have argued and portrayed. That, at least, shows we should not be pressured to pass such significant legislation in a hurried or cursory fashion. It is not wise for the Senate to rush into a decision that will have a permanent impact and, in fact, do permanent damage to our environment, our national energy strategy, and our national values while at the same time being of little value to the American people.

I will discuss some of the contentions made by proponents of drilling our refuge and offer some comments.

Proponents of drilling have argued that the Inupiat Eskimos in the town of Kaktovik are being deprived of their right to drill on refuge land that they own in fee simple. I was struck by that argument when it was made Friday when I was in the Chamber.

I have done a little research over the weekend. I find that the Inupiat Eskimos have rights to the surface of lands adjacent to the town of Kaktovik. The Eskimos also were granted subsurface rights by Secretary of the Interior Watt to over 90,000 acres that are adjacent to their town. But those rights were speculative—only granting the right to drill if Congress authorized oil and gas drilling under the surface of the Arctic Refuge.

A 1989 GAO report investigating the transfer of these subsurface rights found that the transfer actually resulted in a profit for Kaktovik even without any oil and gas development.

The point I am making is that no promises have been broken to the Inupiat people. In fact, they were never granted the right to drill in the refuge. That has been clear from the beginning.

I will work with all of my colleagues, as I know the occupant of the chair does, to do everything I can to ensure that the Inupiat people are able to continue to sustain and improve their quality of life. But we have to do so in a manner that is in our national interest and does not sacrifice one of our great national treasures. We must also realize that other Native Americans in Alaska strongly oppose any drilling.

Last Friday I mentioned the plight of the Gwich'in of Arctic Village who depend on the Porcupine caribou herd to sustain their lives and their culture. Today I will read from a letter by the city of Nuiqsut, sitting in the shadow of the Alpine oil field on the North Slope. I ask unanimous consent this letter be printed in the RECORD.

There being no objection, the letter was ordered to be printed in the RECORD, as follows:

CITY OF NUIQSUT,
Nuigsut, AK, April 11, 2001.
Letter from City Council to Cumulative Effects Committee Members.

Patricial Cochran.

Representative/Member, National Research Council, National Academy of Sciences.

DEAR SIR OR MADAM: Thank you for coming to Nuiqsut and seeking our input on the cumulative effects of oil and gas development on our community and the North Slope. Your tight schedule did not allow us to fully share all of our comments with you, so we write today to summarize our thoughts and supplement our comments. This summary is not meant in any way to be a substitute for the heart felt comments you heard at the meeting or the written testimony that was carefully prepared for you and submitted to you at the meeting. It is only a supplement to those thoughts and comments and a request for further consideration of our views in the report that you prepare.

The impact of oil and gas development on our village has been far reaching. As you now know first hand from your visit, we are literally surrounded by the infrastructure to produce oil and gas. This has affected our day-to-day lives in several ways. Our ability to hunt and gather traditional foods has been severely impacted by development, as you heard from everyone who spoke at the meeting. You were provided many examples of how various species have been affected, and how we have had to react and adjust to those changes. You were also told how the land that we consider ours and from which we subsist has in some cases been lost because we did not fill out the right paperwork and/or look at the right maps.

Additionally, oil and gas development has brought many more people to our village that is not permanent residents, but instead come and goes for work. Very few of these individuals have integrated well into our community. There are widespread feelings of distrust and frustration amongst villagers and the workers who come from outside the community, despite efforts to develop trust with one another. We do not fully understand each other's cultures and we resent each other still, despite our mutual efforts to get to know one another and to get along.

Development has increased the smog and haze in our air and sky, affecting our health as well as the beauty of our land, sea, and air. Drugs and alcohol traffic have increased as development has grown; the ice road that reduces our freight costs also increases the flow of illegal substances into our community. The stress of integrating a new way of life with generations of traditional teachings has led some to alcohol and drug abuse, a phenomenon unknown before white people came to Alaska and greatly exacerbated by the recent spate of growth associated with North Slope oil and gas development and for us in Nuiqsut, even more exacerbated by growth associated with Alpine.

However, like all Alaskans, we have also benefited from oil and gas development. The State and Borough have more money to spend on community facilities, schools, modern water and sewer system, and similar projects. The City has also received funds to mitigate some of the impacts of development. At the individual level, we each receive a permanent fund dividend every year that is funded by excellent investment of